

REMARKS

In the January 21, 2005 Office Action, the Examiner rejected every pending claim under 35 U.S.C. §102(b) as allegedly being anticipated by U.S. Patent No. 4,580,691 to Hansen ("Hansen"), unpatentable over Hansen in view of U.S. Patent No. 4,342,988 to Thompson et al. ("Thompson"), or unpatentable over Hansen in view of U.S. Patent No. 6,321,771 to Brazier et al. ("Brazier").

By this Amendment, Applicants have amended claims 1, 17, 34, and 55 to more particularly describe the invention of these claims. Accordingly, claims 1-55 are currently pending. Exemplary support for the claim amendments appears at least in paragraphs 41, 42, and 47 of the originally filed specification and originally filed drawing figures 2, 3b, 3c, and 3e-3j. Accordingly, no new matter is introduced by this Amendment.

Hansen Does Not Anticipate Current Independent Claims 1, 17, 34, and 55

As currently amended, independent claims 1, 17, 34, and 55 all recite, among other things, a pressure relief device comprising a low pressure support member including an annular flange and at least one supporting projection or arch arranged to exhibit radial asymmetry. Applicants intend the claim language "at least one" to be interpreted as synonymous with "one or more than one." These features are not disclosed in Hansen.

Under 35 U.S.C. § 102, "[a] claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." M.P.E.P. § 2131 (8th ed. 2001), p. 2100-70, quoting *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir.

1987). For at least the following reasons, Hansen does not teach or suggest each and every element of the invention as claimed.

In rejecting the original claims as allegedly anticipated by Hansen, the Examiner explained that “the low-pressure support member (50) could be configured as either symmetric or asymmetric depending on the reference diameter of the passage (11) spanned by the support member (50).” (January 21, 2005 Office Action, Page 3). By referring to a “reference diameter of passage (11) spanned by the support member (50),” it is clear that the Examiner interpreted “symmetrical” as relating to “bilateral symmetry” and not as relating to “radial symmetry.”

For purposes of clarification, Applicants have referenced and provide below Merriam-Webster’s dictionary definition of “symmetry,” “bilateral symmetry,” and “radial symmetry.” “Symmetry” is defined as:

1 : balanced proportions; *also* : beauty of form arising from balanced proportions 2 : the property of being symmetrical; *especially* : correspondence in size, shape, and relative position of parts on opposite sides of a dividing line or median plane or about a center or axis -- **compare BILATERAL SYMMETRY, RADIAL SYMMETRY.**

Merriam Webster’s Collegiate Dictionary 1190-91 (10th ed. 2001) (emphasis added).

“bilateral symmetry” is defined as:

: symmetry in which similar anatomical parts are arranged on opposite sides of a median axis so that only one plane can divide the individual into essentially identical halves

Merriam Webster’s Collegiate Dictionary 112 (10th ed. 2001).

and “radial symmetry” is defined as:

: the condition of having similar parts **regularly arranged around a central axis**

Merriam Webster's Collegiate Dictionary 960 (10th ed. 2001)
(emphasis added).

As noted above, independent claims 1, 17, 34, and 55 presently recite, among other things, a pressure relief device comprising a low pressure support member including an annular flange and at least one supporting projection or arch arranged to exhibit radial asymmetry. Exemplary support for these claim recitations appear at least in the disclosure of paragraphs 41, 42, and 47 of the originally filed specification, originally filed drawing figures 2, 3b, 3c, and 3e-3j, and the “non-symmetric” recitation in original claims 1 and 17.

Hansen discloses a device with a single supporting projection (stay 60) having three appendages (item 54 of Fig. 2). Hansen discloses only a single supporting projection with a radially symmetrical configuration (i.e. exhibiting a configuration where similar parts are regularly arranged about a central axis). Applicants note that the passages of column 8, line 46-51 of Hansen disclose that “alternate geometries for the structure of the stay” are possible, however, the specification provides no guidance as to what alternate configurations are suggested or preferred. Outside of the above-referenced passages of column 8, lines 46-51, the remainder of the disclosure provides no discussion of alternative geometries and Hansen is completely silent as to what constitutes an alternate geometry.

Because Hansen only discloses a radially symmetrical configuration with a single supporting projection exhibiting a configuration where similar parts are regularly arranged about a central axis, Hansen cannot meet the claimed recitations of at least one supporting projection or arch arranged to exhibit radial asymmetry. Since the presently claimed supporting projection, or projections, of the support member are not

equally spaced, pressure relieving characteristics of the relief device are optimized such as, for example, "by reducing the flow of fluid through the pressure relief device 20 when seal 22 opens." (Originally filed specification page 16, lines 10-11).

Accordingly, for at least this reason, Hansen does not teach or suggest a pressure relief device as described in claims 1, 17, 34, and 55. Accordingly, Applicants respectfully request that the rejection of claims 1, 17, 34, and 55, under 35 U.S.C. § 102(b) be withdrawn. In addition, Applicants request that the rejections of claims 2-16, 18-33, and 37-42 also be withdrawn because these dependent claims include additional patentable features as well as the limitations of their respective independent claims.

The references of Thompson and Brazier provide no motivation or suggestion to modify the structure of the Hansen in order to meet the recitations of the independent claims 1, 17, 34, and 55. Similar to the prior art of Hansen, Thompson and Brazier both teach supports having projections that are equally spaced about a circular flange (See e.g. Thompson at column 4, lines 52-55 and stays 32 of Fig. 4; and Brazier at column 6, lines 10-16 and legs 60 of Fig. 3). Accordingly, neither Thompson nor Brazier compensate for the deficiencies of Hansen.

Hansen Does Not Anticipate Independent Claim 43

In the Office Action of January 21, 2005, independent claim 43 was rejected under 35 U.S.C. § 102(b) as allegedly being anticipated by Hansen. Applicants respectfully traverse this rejection for at least the following reasons.

Independent claim 43 recites, among other things, a pressure relief device comprising a low pressure support member including an annular flange having an opening with a centerline. The pressure relief device further includes at least one arch

which extends from a first interior point along the annular flange to a second interior point along the annular flange. The first and second interior points are disposed on one side of the centerline and an apex of the at least one arch is disposed on an opposite side of the centerline. These features are not disclosed by Hansen.

As noted above, Hansen discloses a device with a single supporting projection (stay 60) having three appendages (item 54 of Fig. 2). Hansen discloses only a single supporting projection with a radially symmetrical configuration (i.e. exhibiting a configuration where similar parts are regularly arranged about a central axis). Irrespective of how the claim term “arch” is interpreted, Hansen discloses an apex disposed on the same side of a centerline drawn across its annular flange (item 51 of Fig. 2), or directly coincident therewith, as the first and second interior points.

Because the only configuration disclosed in Hansen shows that appendages of stay 60 are equally “spaced approximately 120 degrees apart from one another,” any centerline across the annular flange 51 will directly intersect the center of the stay 60 (Hansen column 8, lines 46-48). Accordingly, the apex of stay 60 is not disposed on an opposite side of the centerline from first and second interior points of the stay 60.

For at least this reason, Hansen does not teach or suggest a pressure relief device as described in claim 43. Accordingly, Applicants respectfully request that the rejection of claim 43, under 35 U.S.C. § 102(b) be withdrawn. In addition, Applicants request that the rejections of claims 43-54 also be withdrawn because these dependent claims include additional patentable features as well as the limitations of their respective independent claims. The references of Thompson and Brazier provide no motivation or

suggestion to modify the structure of the Hansen in order to meet the recitations of the independent claim 43.

CONCLUSION

In view of the foregoing remarks, this claimed invention is neither anticipated nor rendered obvious in view of the prior art references cited against this application.

Applicants therefore requests the entry of this Amendment, the Examiner's reconsideration and reexamination of the application, and the timely allowance of the pending claims.

The Office Action contains characterizations of the claims and the related art with which Applicants does not necessarily agree. Unless expressly noted otherwise, Applicants decline to subscribe to any statement or characterization in the Office Action.

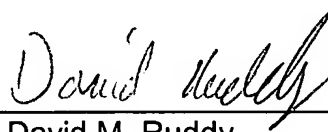
In discussing the specification, claims, and drawings in this Amendment, it is to be understood that Applicants is in no way intending to limit the scope of the claims to any exemplary embodiments described in the specification and/or shown in the drawings. Rather, Applicants are entitled to have the claims interpreted broadly, to the maximum extent permitted by statute, regulation, and applicable case law.

Please grant any extensions of time required to enter this response and charge any additional required fees to our deposit account 06-0916.

Respectfully submitted,

FINNEGAN, HENDERSON, FARABOW,
GARRETT & DUNNER, L.L.P.

Dated: July 20, 2005

By: 
David M. Ruddy
Reg. No. 53,945